

Scaled data based on original data using  
LM-79-2019 Approved Method: Electrical and Photometric Measurements of Solid-  
State Lighting Products

Test Report Prepared for

Cooper Lighting Solutions

(formerly Eaton)

Brand: CORELITE

Report Number: P564278

Luminaire Tested: **SQ4-PR1-100U-075D-940-1D-UNV-STD-W-4**

Issue Date: 7/30/2021

**Test Information**

Test Method: LM-79-2019  
Report Number: P564278  
REPORT IS SCALED FROM IESNA LM-79-08 TEST DATA (G3-1910-536-23, G2-2106-289-4)  
Test Lab: INNOVATION CENTER  
Issue Date: 7/30/2021  
Manufacturer: COOPER LIGHTING SOLUTIONS (FORMERLY EATON)  
Product Line: CORELITE  
Catalog Number: SQ4-PR1-100U-075D-940-1D-UNV-STD-W-4  
Description: CORELITE SQ4 SUSPENDED LED LUMINAIRE WITH PERCEIVE RIPPLE CONTINUOUS LENS.  
DOWNLIGHT 750 LUMENS PER FOOT  
UPLIGHT 1000 LUMENS PER FOOT  
Light Source: 4000K CCT, 90 CRI LEDS  
Ballast/Driver: ELECTRONIC DRIVER

**Summary**

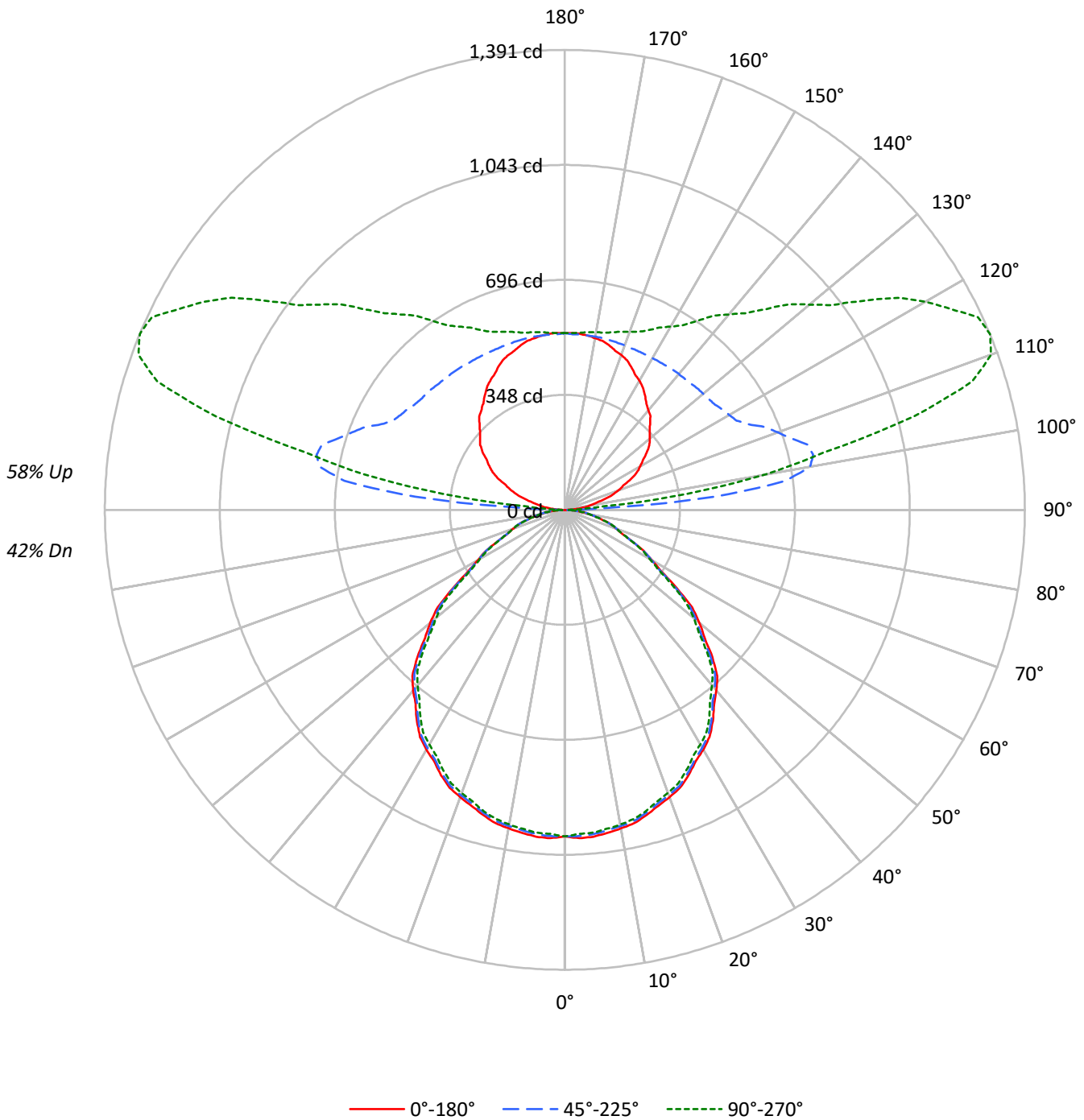
Lumens per Lamp: N/A  
Luminaire Lumens: 5942.2 lumens  
Efficiency: N/A  
Efficacy: 121.0 lumens/watt  
Spacing Criteria (0/90/45): 1.26 / 1.24 / 1.35  
Luminous Opening: Rectangular (W 0.29' x L: 4' x H: 0')  
CIE Type: General Diffuse

Input Watts (W): 49.1  
Input Voltage (V): 120  
Input Current (Ain): NR  
Voltage Rise (V): NR  
Power Factor: NR  
Total Harmonic Distortion (THDi): NR  
Frequency (hertz): 60  
Stabilization Time: NR  
Operation Time: NR  
Ambient Temperature (°C): NR  
Test Distance: 24 FT



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### Luminous Intensity Polar Plot





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**COEFFICIENT OF UTILIZATION - ZONAL CAVITY METHOD:**

RF	20				20				20				20				20	
RC	80				70				50				30				10	0
RW	70	50	30	10	70	50	30	10	50	30	10	50	30	10	50	30	10	0
RCR																		
0	105	105	105	105	96	96	96	96	79	79	79	63	63	63	48	48	48	42
1	96	92	88	85	88	84	81	78	69	67	65	56	54	53	43	42	41	35
2	88	81	75	70	80	74	69	64	61	57	54	49	47	44	38	37	35	30
3	80	71	64	58	73	65	59	54	54	49	46	44	40	38	34	32	30	26
4	73	63	55	49	67	58	51	46	48	43	39	39	35	33	31	28	26	22
5	67	56	48	42	61	52	45	39	43	38	34	35	31	28	28	25	23	19
6	62	50	42	37	56	46	39	34	39	33	29	32	28	25	25	22	20	17
7	57	45	38	32	52	42	35	30	35	30	26	29	25	22	23	20	18	15
8	53	41	34	28	48	38	31	27	32	27	23	26	22	20	21	18	16	14
9	49	38	30	25	45	35	28	24	29	24	21	24	20	18	19	17	15	12
10	46	34	27	23	42	32	25	21	27	22	19	22	19	16	18	15	13	11

**AVERAGE LUMINANCE (cd/sqm):**

	0°	45°	90°
0°	9113	9113	9113
5°	9195	9123	9076
10°	9165	9102	9054
15°	9125	9068	9020
20°	9079	9021	8954
25°	9015	8954	8850
30°	8918	8854	8727
35°	8786	8710	8585
40°	8586	8493	8340
45°	8236	8092	7925
50°	7619	7437	7290
55°	6650	6500	6363
60°	5604	5556	5447
65°	4846	4866	4829
70°	4451	4475	4475
75°	4274	4274	4306
80°	4022	4070	4022
85°	3239	3599	3599



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**ZONAL LUMENS:**

Zone	Lumens	% Fixture
0°-10°	93.4	1.6
10°-20°	267.2	4.5
20°-30°	403.1	6.8
30°-40°	480.2	8.1
40°-50°	473.5	8.0
50°-60°	361.8	6.1
60°-70°	223.9	3.8
70°-80°	127.2	2.1
80°-90°	39.8	0.7
90°-100°	250.2	4.2
100°-110°	690.9	11.6
110°-120°	712.5	12.0
120°-130°	572.6	9.6
130°-140°	450.0	7.6
140°-150°	345.1	5.8
150°-160°	248.0	4.2
160°-170°	151.7	2.6
170°-180°	51.1	0.9
0°-30°	763.7	12.9
0°-40°	1243.9	20.9
0°-60°	2079.2	35.0
0°-90°	2470.1	41.6
90°-120°	1653.6	27.8
90°-150°	3021.2	50.8
90°-180°	3472.0	58.4
0°-180°	5942.2	100.0

**CANDELA DISTRIBUTION:**

	0°	22.5°	45°	67.5°	90°	Flux
0°	988	988	988	988	988	
5°	993	982	985	982	980	94
15°	955	945	949	946	944	270
25°	886	875	880	870	869	408
35°	780	771	773	763	762	487
45°	631	623	620	609	607	484
55°	413	407	404	397	396	370
65°	222	220	223	221	221	225
75°	120	120	120	121	121	127
85°	31	32	34	34	34	36
90°	2	3	7	8	8	4
95°	37	135	454	187	121	39
105°	123	190	760	1160	1093	131
115°	221	267	612	1212	1378	217
125°	303	344	555	939	1102	269
135°	364	404	540	761	858	282
145°	422	452	533	648	697	264
155°	476	492	528	581	599	219
165°	516	522	531	552	556	145
175°	534	535	532	540	538	51
180°	534	534	534	534	534	



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**CANDELA DISTRIBUTION (FULL):**

	0°	22.5°	45°	67.5°	90°
0°	987.7	987.7	987.7	987.7	987.7
2.5°	993.8	985.1	987.7	985.5	980.9
5°	992.8	982.0	985.1	981.7	980.0
7.5°	985.1	974.5	977.6	974.2	973.2
10°	978.3	968.3	971.5	968.1	966.4
12.5°	970.8	960.2	964.0	959.9	958.2
15°	955.3	945.4	949.4	945.9	944.3
17.5°	938.3	927.7	931.7	927.7	925.6
20°	924.7	914.7	918.8	912.8	912.0
22.5°	909.7	899.8	903.8	895.8	895.6
25°	885.6	874.8	879.6	870.2	869.4
27.5°	856.8	846.8	850.9	841.3	840.3
30°	837.1	827.1	831.1	820.9	819.2
32.5°	814.6	805.3	808.7	798.4	797.4
35°	780.1	770.9	773.3	763.1	762.2
37.5°	740.8	732.5	733.8	722.6	721.7
40°	712.9	704.6	705.2	693.3	692.5
42.5°	682.3	673.9	673.2	661.3	660.5
45°	631.2	622.9	620.2	609.1	607.4
47.5°	573.0	564.7	559.6	550.5	549.4
50°	530.8	522.5	518.1	510.4	507.9
52.5°	485.2	476.9	473.2	466.1	463.6
55°	413.4	406.8	404.1	397.2	395.6
57.5°	345.2	340.7	339.9	333.3	332.6
60°	303.7	301.2	301.1	295.2	295.2
62.5°	268.3	266.5	267.8	263.9	263.2
65°	222.0	220.4	222.9	221.2	221.2
67.5°	185.5	185.5	187.0	186.3	186.3
70°	165.0	165.0	165.9	165.9	165.9
72.5°	146.7	146.0	148.2	148.2	147.5
75°	119.9	119.9	119.9	120.8	120.8
77.5°	93.4	93.6	94.3	94.1	93.4
80°	75.7	76.5	76.6	75.7	75.7
82.5°	58.0	58.8	58.9	58.7	58.0
85°	30.6	32.3	34.0	34.0	34.0
87.5°	9.2	12.2	15.0	15.1	14.6
90°	1.7	3.4	6.8	7.7	8.5
92.5°	15.4	63.9	114.2	41.7	32.5
95°	36.8	135.4	454.0	186.6	121.4
97.5°	60.9	151.7	672.5	517.8	375.0
100°	78.7	161.4	753.2	758.6	616.4
102.5°	95.8	172.5	769.0	937.3	802.5
105°	123.1	190.0	760.1	1160.4	1092.7
107.5°	152.2	211.7	717.7	1268.0	1292.7
110°	172.7	226.2	684.8	1291.1	1371.4



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**CANDELA DISTRIBUTION (continued):**

	0°	22.5°	45°	67.5°	90°
112.5°	191.2	242.7	654.1	1272.9	1391.2
115°	220.6	266.6	612.2	1211.9	1378.2
117.5°	246.2	292.0	584.6	1126.0	1315.3
120°	263.3	308.5	573.7	1067.9	1258.5
122.5°	279.8	322.9	564.8	1013.7	1194.2
125°	302.7	344.5	554.9	939.1	1102.1
127.5°	322.2	364.0	549.1	876.0	1016.6
130°	335.2	377.0	546.3	837.4	965.3
132.5°	347.5	387.3	543.6	805.0	920.8
135°	364.2	403.5	539.5	760.6	857.6
137.5°	383.0	418.8	537.4	723.3	806.1
140°	393.3	428.4	536.1	698.5	771.2
142.5°	404.9	437.4	534.7	676.4	740.4
145°	422.4	451.6	532.7	647.5	696.8
147.5°	439.1	464.7	530.8	623.1	661.4
150°	451.4	472.3	530.1	608.6	639.5
152.5°	461.0	480.6	529.4	596.2	621.7
155°	476.2	492.1	528.4	581.0	599.3
157.5°	490.2	502.5	528.6	569.9	582.4
160°	498.5	509.3	529.2	563.6	572.8
162.5°	505.3	514.8	529.9	558.1	565.3
165°	515.6	522.2	530.9	551.6	555.7
167.5°	523.4	527.4	531.8	547.6	548.9
170°	527.5	530.9	531.8	545.5	545.5
172.5°	530.9	533.0	531.8	542.7	542.1
175°	534.4	535.2	531.8	539.5	537.8
177.5°	535.7	535.1	531.6	536.4	535.0
180°	534.4	534.4	534.4	534.4	534.4

(END OF REPORT)